ABSTRACT OF THE DISCLOSURE

A communication apparatus that shares precise return channel uplink timing information includes a common symbol timing reference and one or more control stations that each transmit independent asynchronous DVB data streams which evenly share the common symbol timing. The control stations each include respective delay trackers to determine broadcast transmission delays associated with the particular control station and transmission path. Each broadcast data stream includes the same non real-time frame marker and a transmission delay message particular to the respective control station. A remote receiver receives one of the broadcast streams and timestamps the non real-time frame marker with a local time of receipt. A timing recovery circuit determines an upcoming return channel frame start time by adjusting the local time of receipt by the particular broadcast transmission delay and a unique receiver offset time. A local transmitter subsequently uplinks a TDMA message in a predetermined time-slot after the return channel frame start time. The method for transmitting a frame synchronized message includes receiving a non real-time frame reference marker in a receiver, timestamping the received frame reference marker with a reception time, and subsequently receiving a control node timing differential at the receiver. The local reception time of the non real-time frame marker is corrected to determine the proper return channel frame transmit start time by applying the control node timing differential and the local offset time. Users then uplink a message during an assigned period after the return channel frame transmit start time.